

Citrus Industry

SCIENCE AND INDUSTRY

Representative of Every Interest
Representing No Special Interest

Subscription - - - \$1.00 Per Year
In Continental U. S.
\$2.00 Per Year Outside

S ANGELES PUBLIC LIBRARY

OCT 8 1953 Among Florida Citrus Leaders

STAGE



O. C. MINTON

Mr. Minton is at present serving as chairman of the Florida Citrus Commission, of which body he has been a member for the past six years. He has long been actively associated with citrus affairs of the State. He is vice-president of NACO Fertilizer Company, making his home and headquarters at Fort Pierce.

This
Month

Citrus Insect Control For October, 1953
An Improved Dowicide A-Hexamine Method For Decay Control
In Citrus Fruits
Citrus Mutual Seeks Aid For Grapefruit
Horticultural Society To Meet Nov. 3-5 In Daytona Beach
Florida Citrus Commission Presents Annual Report
Citrus Sales Continue High Despite Advance In Price

Vol. 34, No. 10

Bartow, Florida

October, 1953

Compare parathion during winter months with the spray material you are now using...

PARATHION

Soluble solids content

No adverse effect

Vitamin C content

No adverse effect

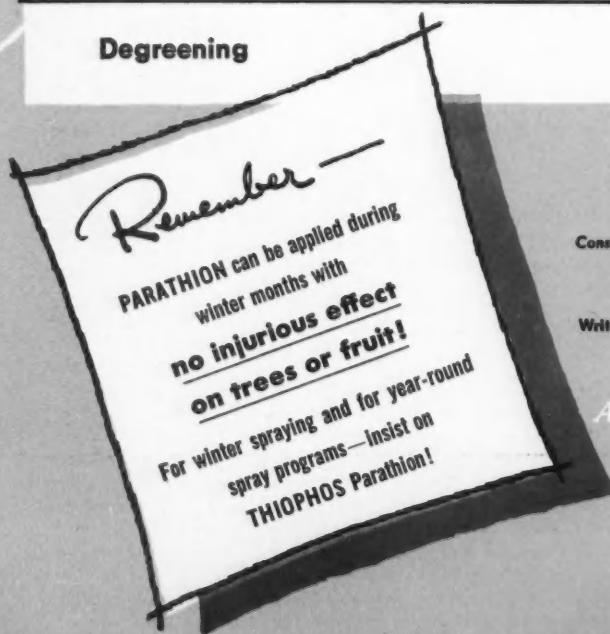
Fruit color

No adverse effect

Degreening

Does not retard

(Data sources available on request)



PARATHION INSECTICIDES ARE
AVAILABLE FROM
NATIONAL MANUFACTURERS

Consult your local agricultural authorities for suggestions
on dosages and application procedures.

Write for new PARATHION GROWER'S HANDBOOK



AMERICAN Cyanamid COMPANY

Manufacturer of **Thiophos®** Parathion Technical
Agricultural Chemicals Division
Brewster, Florida

Citrus Insect Control For October, 1953...

R. M. PRATT AND W. L. THOMPSON
FLORIDA CITRUS EXPERIMENT
STATION, LAKE ALFRED

There has been some increase in purple scale activity during September, but the average level of infestation is low. No important change in the situation is expected to occur during October. While this scale is present in small numbers in nearly all groves, only a few have moderate to heavy infestations.

Red scale activity increased a little more than purple scale activity during the past three weeks, but the general level of population of this scale is also very low. Red scale is not expected to present a serious control problem during the Fall months.

Purple mites are rare in nearly all groves but a few have moderate infestations. The highest activity in recent weeks has been in the Ridge District. The trend in activity during October will be determined by the amount of wet weather, but the present level is so low that a major outbreak this month is unlikely. However, we are approaching the season when serious defoliation may be expected to follow purple mite infestations, and care should be taken to keep infestations at low levels in all groves.

Rust mite activity has been declining gradually during September, but the level is still moderately high. Care should be taken to keep rust mites under control and avoid unnecessary losses from greasy spot and russetted fruit.

SPRAY PROGRAMS

By early October, it can be pretty well determined whether any Fall spraying for scale is necessary. Even though the forecast of purple and red scale indicated low levels of infestations, there are always exceptions. Inspections of tangerines and early varieties of oranges and grapefruit should be made for purple and chaff scale on the fruit. If any amount of scales are on the fruit, the trees should be sprayed since the area around the scale does not degreen until the fruit colors naturally.

Where any Fall spraying is necessary, it should be done as early in October as practical. Parathion is recommended for the control of scale in the Fall and Winter months but it usually is more effective in October than in either November or December. It is not always practical to use parathion, and an oil spray is

the only other effective scalicide. Most growers are aware that oil sprays reduce solids and retards degreening but it is better to spray with oil than omit a necessary scalicide. If oil is to be used, make the application as early in October as possible to minimize the danger of leaf drop and dead wood from possible cold weather later in the Winter. Late October, November and December oil sprays also may prevent a normal amount of bloom next year.

When purple mites are found in a grove an effective miticide should be used before a heavy infestation develops. Even though the general level of purple mites is low, there is no reason to believe there will not be the usual infestations in November. The longest periods of control have been where a fall application of a miticide was made while the mite population was at a low level. If it is necessary to spray the grove for rust mite control, it is a good practice to include a miticide if any purple mites are present. When checking the grove, inspect the summer and fall growth for purple mites.

Rust mite infestations have been unusually heavy and due to the heavy rains washing the sulfur off the fruit and leaves, the period of control has been comparatively short.

A more thorough coverage of foliage and fruit than is usually practiced will result in a longer period of control of purple and rust mites. It is as necessary to thoroughly cover the tops of the trees as it is the lower areas because the tree tops are more exposed to the elements.

Plant bugs are sometimes a pest on early varieties of oranges in groves where there is a leguminous cover crop and where citrons are growing. If oranges are coloring prematurely, inspect them for plant bugs.

Scale Control: Parathion at 1 to 1 2/3 pounds per 100 gallons is recommended for October spraying. Add 6 to 8 pounds of wettable sulfur to the parathion spray for rust mite control and if purple mites are present, Ovotran or DN 111 can be added. If it is not practical to use parathion, use oil emulsion at 1.3% actual oil.

Purple mite control: Use either Ovotran at 1 1/4 pounds on DN 111 at 1 1/4 pounds per 100 gallons if tem-

perature is not above 88°. DN 111 can be used with wettable sulfur but Ovotran can be used with lime-sulfur and wettable sulfur.

Rust mite control: Use wettable sulfur 6 to 8 pounds per 100 gallons or sulfur dust on tangerines and early varieties of oranges. Lime-sulfur at 3/4 gallons plus 5 to 8 pounds of wettable sulfur can be used on grapefruit and late varieties of oranges.

Plant bug control: Use toxaphene at 16 to 25 pounds of a 25% wettable powder or parathion at 3 pounds per acre, applied to the trees and cover crop.

Grasshopper Control: Use Chlorodane at 1.5 to 2.0 pounds (technical) or toxaphene at 3.5 to 4.5 pounds per acre. Chop or disc the cover crop before spraying.

For more detailed information refer to the 1953 "Better Fruit Program" or consult the Citrus Experiment Station at Lake Alfred or Fort Pierce.

Shortage Of Citrus Juices Cause Delay In Advertising

Extremely short stocks of Florida processed citrus products, including canned single strength juices, section packs, and frozen concentrates, has made it necessary for the Florida Citrus Commission to postpone advertisements scheduled in national magazines for September, October, and part of November. Paul S. Patterson, Commission advertising manager, disclosed recently.

The space saved by these cancellations will be used to extend the Commission's program on processed grapefruit next Spring when Florida is expected to be in the midst of a large pack from the 1953-54 crop, Patterson explained.

The Commission's merchandising representatives in the field have for the past several weeks reported that retailers and wholesalers were complaining of short supplies on hand and of their inability to replenish their diminishing stocks from their Florida processors, Patterson said.



New Buds, Lake Garfield Nurseries, Photographed September 1953

Extra Care Makes Extra Quality Trees

These pictures help tell the story of the better quality of LAKE GARFIELD Trees. Every detail, from the selection of seed for budding stock, the lining out, BUDWOOD SELECTION from our own groves of the respective varieties, training of the young buds, fertilizing, spraying, to the digging and delivery of the trees, has the most exacting care by men of many years' experience, who keep up with all tested scientific developments. Our customers tell us we grow the best trees, and give the most efficient service.

Many Orders Already Placed For Coming Season

Experienced growers know the importance of placing orders early, and we now have orders for many thousand trees. The demand for LAKE GARFIELD Trees exceeds the supply in some varieties every year. PLEASE DO NOT DELAY. Call on the phone, write or come to see us. Let us know the varieties, rootstock, and approximate number of trees, and we will tell you what we can do for you, and will also come to see your grove land if desired.

Lake Garfield Nurseries Company

Citrus Trees Exclusively

P. O. Box 154T, Bartow, Florida

Office North of Postoffice. Day Phone 2-4601; Night 2-5511 or 3-1451



These will be the 2-year Buds for Winter and Spring Planting. Photographed September 1953



Publication office at Bartow, Florida. Entered as second class matter February 16, 1920, at the post office at Tampa, Florida, under act of March 3, 1879. Entered as second class matter June 19, 1933, at the post office at Bartow, Florida, under act of March 3, 1879.

An Improved Dowicide A-Hexamine Method...

For Decay Control In Citrus Fruits¹

Many shippers and packinghouse operators have realized the extent of fruit losses from decay and are now interested in ways to reduce this loss. A number of methods for treating citrus fruits in commercial packinghouses have been proposed but all are subject to a number of limitations in that they not only must effectively control decay, but be inexpensive, not injure the fruit or its appearance, leave no toxic residues, and must fit into packinghouse operations.

The Dowicide - Hexamine treatment originally proposed by the authors (1, 2) fulfilled all the above requirements except that it decreased the shine obtained by the polishing operation. This was due to the slight residue left on the surface.

Since a high degree of shine is considered by fruit shippers to be of paramount importance in the marketing of citrus fruits, an extensive study, was started in the spring of 1952 and continued through the entire 1952-53 season on ways of improving the Dowicide A - Hexamine method. This study involved a comparison of the original "left-on" treatment with a

E. F. HOPKINS AND K. W. LOUCKS
FLORIDA CITRUS EXPERIMENT
STATION, LAKE ALFRED

"rinse-off" procedure in which the fruit was given a water rinse after the treatment. Effects on decay control and shine were the main items under consideration. At this point it can be stated that the results were very gratifying in that the rinse-off treatment was shown to give excellent protection against decay without interfering with shine. Several commercial packinghouses now using this improved method report satisfactory results.

The original Dowicide A - Hexamine mixture which tended to form tenacious crystals on the surfaces of the dipping tank, has been modified. Soap, which originally was added, is now omitted and in its place a small amount of sodium hydroxide is used. This gives a more stable solution and fewer crystals. In some houses where hard water is encountered, precipitation is prevented by adding sodium salt of ethylenediaminetetraacetic acid (Na EDTA). The amount added depends on the hardness of

the water. The formula of the modified solution is as follows:-

Dowicide A (sodium orthophenylphenate)	2.0%
Hexamine (hexa-methylene-tetramine)	1.0%
Sodium Hydroxide (caustic soda)	0.4%
Na EDTA*	as needed

The solution is applied (after the color-added treatment, if used) at 90°F. as a dip for two minutes or as a flood for three minutes. In either case the fruit is given a water rinse following the application. It will be shown that either dip or flood gives good decay control. The treatment fits in with the usual packinghouse operations. As will be brought out later more effective action of the treatment will be obtained if the fruit is stored at a fairly low temperature (e. g., 60°F.). Citrus fruits receiving the Dowicide A - Hexamine application as above described have no chemical odor and develop no off-taste due to the treatment.

In order to obtain reliable information as to the best procedure necessary for an effective rinse-off treatment, a series of 32 experiments extending over the entire 1952-53 fruit season was carried out. Four varieties of oranges:

1. Cooperative investigation by the Florida Citrus Commission, Lakeland and the Citrus Experiment Station, Lake Alfred, Florida.

Hamlin, Parson Brown, Pineapple and Valencia, were treated with Dowicide A - Hexamine. The concentration as well as the temperature of the treating solution was varied. Two holding temperatures, 60°F. and 70°F. were used. All treatments were rinse-off with the exception of a left-on treatment for comparison. In each experiment there were nine lots treated with Dowicide A - Hexamine plus two control lots. An equal number of experiments was made with oranges degreened with ethylene in the coloring room and with those not requiring degreening.

All fruits were washed, given a color-added application, dried, and waxed with solvent wax in accordance with commercial practice. The Dowicide A - Hexamine treatment followed the color-added process. All of the processing was done with equipment at the Citrus Experiment Station. Inspections for decay were made at the end of one, two and three weeks from the date of picking.

For the sake of brevity only total losses from the decay are given in this article. This "total decay" is the sum of decay caused by molds (mostly *Penicillium digitatum*) and stem-end rots caused by *Diplodia natalensis* and *Phomopsis citri*. All these types of decay, which are responsible for practically all spoilage in the marketing of Florida citrus fruits, were reduced by the Dowicide A - Hexamine rinse-off treatment.

Dowicide A - Hexamine Rinse-off Treatment of Oranges.—In all cases where the fruit was rinsed the shine, as judged by a number of experienced observers was considered equal to that in the untreated control lots. In the one treatment where the fruit was not rinsed it was judged to have poorer shine than the control. These observations were in agreement with the packinghouse operators in houses where the rinse-off method has been used.

The decay incidence for two and for three weeks is brought out in Fig. 1, where each histogram represents the average value obtained in the 32 experiments. The treatments used are described in the legend. For the two weeks holding period all treatments gave excellent decay control at 70°F. When the fruits were not rinsed following the fungicidal dip (No. 2) the re-

sult was only slightly more favorable than when a rinse was used (No. 3). Increasing the temperature (No. 4) or the concentration of the solution (No. 5) or both (No. 6) did not increase the effectiveness of Dowicide A - Hexamine. However, a double treatment (No. 7)—one before and one after degreening—was even more effective than the single left-on method and may be advantageous where bulk handling is practiced.

so rapidly as to be serious at one week. Observations made during these experiments have indicated that treatments which are effective at 2 weeks are equally effective during 1 week holding.

To test the possibility of an extremely heavy rinse, following the treatment, resulting in poor decay control an experiment was set up to compare a light rinse with a heavy rinse. The light rinse used was sufficient to rinse each fruit

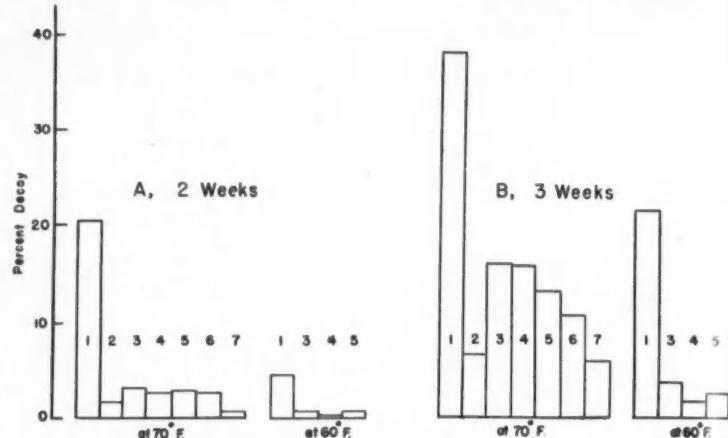


Fig. 1 Effect of Dowicide A - Hexamine treatment on decay of oranges during the 1952-53 season: (1) untreated checks; (2) Dowicide A, 2 percent, 90°F, not rinsed; (3) Dowicide A, 2 percent, 90°F, rinsed; (4) Dowicide A, 2 percent, 110°F, rinsed; (5) Dowicide A, 4 percent, 90°F, rinsed; (6) Dowicide A, 4 percent, 110°F, rinsed; (7) Dowicide A, 2 percent, 90°F, double treatment, rinsed.

After three weeks holding at 70°F. the effects of rinsing, of temperature of treatment, and of concentration of the solution, showed differences which might be expected but still indicated a practical degree of decay control for the rinse-off methods. These results show that to obtain a satisfactory rinse-off method it will not be necessary to increase the concentration or

but adequate to prevent dulling of the shine. The flow was regulated to give 2½ times as much water per minute for the heavy rinse as for the light. Six replications with Valencia oranges were used for each procedure together with duplicate control lots. Somewhat less decay was found in lots of oranges receiving the light rinse but statistical analysis of the data failed to show

Table 1.—Dowicide A - Hexamine Rinse-off Treatment of Oranges held in storage at 40°F.

	Percent of Total Decay					
	8 Weeks		12 Weeks			
	Check	DH*	DH**	Check	DH*	DH**
Pineapple	35.1	0.5		1.0	78.1	14.0
Valencia	12.0	1.7		37.6	9.9	5.2

*DH Dowicide A - Hexamine rinsed off.

**DH Double treatment with Dowicide A - Hexamine; Flooded on, stood 48 hours, processed and flooded with Dowicide A - Hexamine and rinsed off.

the temperature of treatment beyond the original recommendations of 2% Dowicide and 90°F. Excellent protection against decay during the marketing period may be had by a double treatment (No. 7) which would be feasible where bulk handling is used.

There are occasions under which decay of citrus fruits may develop

a significant difference between the light and heavy rinse. Considering that a very heavy rinse was used it would appear that the degree of rinsing is not an extremely critical factor in this treatment.

Dowicide A - Hexamine Rinse-off Treatment of Oranges for Cold Storage.—In Fig. 1 (B) it is shown

(Continued on page 13)

*Sold as Versene by Bersworth Chemical Company and as Sequestrene Na 4 by Alrose Chemical Company.

one
ing
ted
ive

ex-
the
ay
up
a
sed
uit

*Tell You,
Pardner...*

*You Can't Beat
FASCO
Livestock Sprays...*



FASCO Livestock Sprays are the proper medicine for the insect pests that rob you of cattle profits. Flies, mosquitoes, ticks, scab mites, mange mites all yield to these powerful BHC-DDT sprays in FASCO formulations which are packed in 50 and 5-lb. bags.

If you prefer to mix your own sprays, use FASCO 50% DDT Wettable and FASCO BHC 24-WP.



Spectacular Fly Control with FASCO Malathon

Be sure to ask your FASCO dealer about FASCO MALATHON fly sprays and baits. Results achieved against "resistant" flies have been amazing.

FASCO MALATHON sprays and baits are effective around hog pens, kennels, poultry houses and garbage dumps as well as cattle pens and barns.

IDEAL Fertilizers and FASCO Pesticides—Your Profit Combination



WILSON & TOOMER
FERTILIZER COMPANY

and Divisions

FLORIDA AGRICULTURAL SUPPLY COMPANY

Peninsular Fertilizer Works—Tampa • Cartledge Fertilizer Company—Cottondale

GENERAL OFFICES • JACKSONVILLE, FLORIDA

Citrus Mutual Seeks Aid For Grapefruit Market

Florida Citrus Mutual is stepping up activities to help its grapefruit growing members find additional markets for their crops through Uncle Sam's foreign export subsidy program.

Robert W. Rutledge, general manager of the super cooperative, said Mutual is preparing to ask the government to expand its export subsidy program in several ways.

According to Rutledge, a suggestion will be made that the range of citrus products eligible for subsidy be widened to increase powdered citrus juices and citrus soft-drink bases. Mutual will also suggest that the varieties of packs eligible under the program include the six-ounce container and the large No. 10 can which holds three quarts.

Another way in which Mutual hopes Uncle Sam will help is for the government to purchase grapefruit in the form of canned sections and blended juice to serve through the school lunch program.

"We are joining with California and Texas in requesting the government to continue the export subsidy program which expires Sept. 30 unless renewed," Rutledge said.

He indicated that a request for the continuation has been filed and Mutual is now pushing for action to prevent a break between winding up the present program and putting a new one in operation.

"California reaped the largest benefits from the export subsidy program operated last year," Rutledge said. "This year we hope to have our grower members receive more of the advantage, especially on grapefruit."

The program was developed by the government to help farmers recapture their postwar foreign markets and at the same time furnish an additional outlet for agricultural commodities which might have tough sledding if sold entirely on the domestic market. As it is set up, the government absorbs part of the cost enabling Florida citrus shippers and processors to quote at a much lower figure.

Although California reaped the biggest harvest last year on fresh citrus shipments, Florida dominated the export business on canned citrus products.

Florida shippers collected more

than \$400,000 in subsidy on sales made abroad and picked up another \$200,000 on frozen concentrate.

Although Florida shippers and processors did substantially more business with foreign buyers last season than the year before, Mutual is convinced there is an outlet abroad for much more Florida citrus.

"We are doing everything possible to see that this expansion becomes a reality," Rutledge said.

Mutual is also trying to have grapefruit in fresh or processed form included in any programs developed by the government to sell American farm products abroad. Congress has already passed one bill along this line and another containing a half billion dollars has passed the Senate and is awaiting House consideration.

NAVEL ORANGE MARKETING AGREEMENT AND ORDER

The U. S. Department of Agriculture announced today the issuance of a marketing agreement and order regulating the handling of Navel oranges grown in Arizona and that part of California south of the 37th parallel. This action follows approval of the program by 85 percent of the growers, both by number and by volume of production, voting in the referendum conducted during the period August 17 through August 31. Handlers representing 84 percent of the quantity of Navel oranges handled during the 1952-53 marketing season have signed the marketing agreement.

The marketing agreement and order authorize the issuance of volume regulations limiting the shipment of Navel oranges, and the allocation of shipments among handlers on the basis of their tree crop. The program also authorizes the issuance of size regulation.

The marketing agreement and order are based upon evidence presented at a public hearing at Los Angeles, Calif., beginning April 27, 1953, and are to become effective upon publication in the Federal Register.

Organization of the Martin County Farmers Cooperative at Stuart has been announced by the County Agent, L. M. Johnson.

Horticultural Society To Meet At Daytona Beach Nov. 3-5

More than 100 speakers will appear before the Florida State Horticultural Society at the 66th Annual Meetings of the Society at Daytona Beach, November 3 through 5, 1953. The main speaker of the opening general session on Tuesday evening will be Secretary Ezra Benson of the U. S. Department of Agriculture. He will be followed by R. S. Edsall, Vero Beach, who will deliver the Presidential address of the Society.

Preliminary programs of the meetings listing all speakers will be mailed to members of the Society early in October. Additional programs may be obtained by contacting Ernest L. Spencer, Secretary, Manatee Station, Bradenton.

RESEARCH WORKERS TO

STUDY PROCESSING

A conference of research workers and members of the citrus industry will be held at the Citrus Building in Winter Haven, Florida, October 8 to discuss advances in citrus processing research.

According to Dr. G. E. Hilbert, Chief of the Bureau of Agricultural and Industrial Chemistry, this conference is primarily to present the citrus research accomplishments of four laboratories of the Bureau: Citrus Products Station, Winter Haven, Florida; Fruit and Vegetable Laboratory, Weslaco, Texas; Fruit and Vegetable Chemistry Laboratory, Pasadena, California; and Western Regional Research Laboratory, Albany, California. The conference will enable members of the citrus industry and other guests to meet with Bureau scientists investigating citrus utilization problems, and also to become acquainted at first hand with the nature, scope, and accomplishments of the Bureau's present research program on citrus utilization.

The conference will be opened by J. R. Matchett, Bureau of Agricultural and Industrial Chemistry, Washington, D. C., W. C. Scott, O. W. Bisnett, L. J. Swift, and M. K. Beldhuis will discuss their work on citrus research at the U. S. Citrus Products Station. R. B. Guyer, Continental Can Company, Chicago, Illinois, will talk on "Heat Treatment of Orange Juice for Frozen Concentrates"—a cooperative work conducted at the U. S. Citrus Products Station.

Citrus Sales Continue High Despite Advance In Price

The monthly report of the Fruit and Vegetable Branch of the Production and Marketing Administration of the U. S. Department of Agriculture shows that consumers are purchasing citrus fruits in good volume despite a general increase in price.

The report for the month of July, the last for which detailed figures are available, shows the volume of fruit purchased by consumers, the average price paid and a comparison with the volume of other fruits and fruit juices. The report deals only with household purchases and does not include purchases by hotels, restaurants, hospitals and schools.

Prices householders paid for frozen concentrated orange juice and canned single-strength orange juice in July 1953 reflected a continuation of the increases that have occurred in recent months. Consumers paid an average of 16.6 cents per 6-ounce can for frozen orange juice, the highest average since February 1952. The average of 31.5 cents per 46-ounce can for canned single-strength orange juice was the highest since May 1951. At the same time, prices paid for California and Florida fresh oranges were about the same as in July last year. In spite of the generally higher prices for orange juice products, householders' combined purchases of fresh oranges, frozen concentrated orange juice and canned single-strength juice during July were equivalent to about 5,730,000 boxes of oranges, up about 125,000 boxes from a year ago. Purchases of fresh oranges were slightly larger than a year earlier, those of frozen orange juice were up about 10 percent, but purchases of canned orange juice were down 14 percent.

Householders' purchases of fresh grapefruit during July totaled almost 320,000 boxes, about 12 percent less than in the same month last year. Prices of fresh grapefruit were almost unchanged. Purchases of canned single-strength grapefruit juice by consumers amounted to 900,000 cases, down about one-sixth from last July, while prices paid per 46-ounce can were one-fifth higher.

Householders' purchases of fresh lemons, lemon juice, and concentrate for lemonade were equal to 1,229,000 boxes of fresh fruit during July, almost unchanged from a year earlier. Substantially larger purchases of frozen concentrate for lemonade made up for slightly smaller purchases of fresh lemons and lemon juice. Prices paid for fresh lemons averaged 47 cents per dozen, down almost 5 cents from July 1952, while prices paid for canned and bottled juice and frozen concentrate for lemonade were somewhat higher.

Compared with a year earlier, purchases of all canned single-strength citrus juices by householders in July were down. Purchases of prune, pineapple, and tomato juices, on the other hand, were up, and purchases of grape juice were unchanged. Purchases of all canned single-strength juices during the month were almost equal to 7,400,000 cases, about the same as in July 1952. Prices paid for all juices except tomato juice averaged higher than a year earlier.

About 3,780 tons of dried prunes were purchased by householders during July 1953, practically the same as in this month last year. Prices paid, however, averaged 27 cents per pound, almost 3 cents more than in July 1952.

Householders bought about one-third less dried apricots than in July last year. This decline was primarily caused by fewer families buying.

Frozen Juices and Ales

Householders bought about 4,400,000 gallons of frozen concentrated orange juice during July 1953, slightly less than in the previous month. The decline in purchases was associated with an increase in the price consumers paid for frozen orange juice—16.6 cents per 6-ounce can, up $\frac{1}{2}$ cent from the average in June and the highest average since February 1952. Although total purchases were down slightly from the preceding month, the percentage of families buying frozen orange juice increased to 31.4 percent, a record for any month so far. Therefore, the lower volume of purchases during July was the result of a small

decline in the number of purchases per buying family and a slight decrease in the average size of purchase.

For the period January through July 1953, household purchases totaled about 32,000,000 gallons, one-fifth more than in the corresponding period a year ago.

Householders' purchases of frozen concentrated grape juice amounted to 376,000 gallons during July, up 13 percent from June and almost one-fourth more than in July last year. Consumers paid an average of 21 cents for a 6-ounce can of frozen grape juice, about one cent less than in the previous month and in July last year. During the month 6.7 percent of all families bought frozen grape juice, the largest proportion buying this juice in a single month to date.

Householders bought about 50 percent more frozen concentrate for lemonade during July than in the previous month—purchases totaling almost 1,570,000 gallons. Compared with July last year this was an increase of almost one-sixth in householders' purchases. About 17.1 percent of all families purchased frozen lemonade during the month, the largest number during any month so far. They paid an average of 17 cents per 6-ounce can for frozen lemonade, almost unchanged from June, but one cent more than in July 1952. During the period January through July 1953, householders' purchases were about one-fourth larger than in the corresponding months last year.

About 123,000 gallons of shelf pack (non-frozen) concentrate for lemonade were purchased by householders during July at an average price of 15.2 cents per 6-ounce can. This was somewhat less than the volume purchased in the corresponding month of 1952. Prices paid for this lemonade concentrate averaged $1\frac{1}{2}$ cents higher per 6-ounce can than a year ago.

Canned "single-strength" orangeade purchases by householders were equal to 417,000 cases of 24 No. 2 cans, about the same amount as in July a year ago. Prices consumers paid for this orangeade averaged 27.3 cents per 46-ounce can, up about one cent from July

1952. Four percent of the families reported buying canned "single-strength" orangeade, a moderate increase over the proportion that bought in the previous month, or in July last year. Those buying averaged 1 1/3 of the 46-ounce cans per purchase, the same as last year.

Purchases of shelf-pack (non-frozen) concentrate for orangeade by householders amounted to an estimated 224,000 gallons during the month. This was less than in June and was considerably below the amount purchased in July 1952. About 3.5 percent of the households bought shelf pack concentrated orangeade during the month compared with almost 5 percent a year ago. Prices paid averaged 15.7 cents per 6-ounce can, about a cent higher than the average in July last year.

Canned Juices

During July 1953 householders bought a total of about 7,400,000 cases (equivalent No. 2 cans) of canned single-strength juices. Purchases of all canned single-strength citrus juices were less than in July 1952, but purchases of prune, pineapple, and tomato juices were up. A little more than one-half of all families bought one or more of the canned single-strength juices during July, almost as many families as in July a year ago. Purchases of families buying canned juices during the month averaged a little less than three of the 46-ounce cans per buying family, the same as a year earlier.

Consumers bought about 1,300,000 cases (equivalent No. 2 cans) of canned single-strength orange juice during July, 14 percent less than in the same month a year ago. Most of this decline came about because fewer families bought orange juice in this form—less than 13 families per 100 compared with more than 15 families a year ago. The average volume purchased per buying family also was down slightly, amounting in July to a little more than 2 of the 46-ounce cans. Prices consumers paid for canned single-strength orange juice during July averaged almost 32 cents per 46-ounce can, one-sixth more than a year earlier when prices paid averaged 27 cents per can.

Householders bought about 900,000 cases (equivalent No. 2 cans) of canned single-strength grapefruit juice during July 1953. This volume was 16 percent less than that purchased in July a year ago. About 9 out of 100 families bought grapefruit juice during July com-

pared with 10 families buying in July 1952. Purchases averaged about 2 of the 46-ounce cans per family buying during July, compared with more than 2 1/4 cans in July last year. Prices paid averaged almost 27 cents per 46-ounce can, up more than one-fifth from a year earlier.

Consumers purchased about 350,000 cases (equivalent No. 2 cans) of orange-grapefruit blended juice during July, about one-third less than in the same month a year earlier. Less than 4 families per 100 bought this product. The average volume purchased by buying families—more than 1% of the 46-ounce cans—was down only slightly. Prices paid averaged 29 cents per 46-ounce can, up almost one-fifth from a year ago.

Householders' purchases of canned and bottled lemon juice during July were equal to about 170,000 cases of No. 2 cans. This was substantially more than in the preceding month but was almost one-fifth below a year ago. However, on a fresh fruit basis, this drop was more than offset by larger purchases of frozen concentrate for lemonade. A little more than 7 families per 100 bought canned or bottled lemon juice during the month, one-fifth fewer than a year earlier. Purchases per buying family averaged slightly larger than a year ago. Prices paid averaged 12 cents per 5 1/2-ounce can, up one-fifth.

Consumers bought about 1,200,000 cases (equivalent No. 2 cans) of canned pineapple juice during July, almost one-tenth more than in July last year. Prices paid averaged almost 31 cents per 46-ounce can, up a little more than 1 cent from a year earlier. Almost 15 families per 100 bought pineapple juice during July, and their purchases averaged 1% of the 46-ounce cans per family.

Householders bought about 1,900,000 cases (equivalent No. 2 cans) of tomato juice during July. This was below the record set in the preceding month but was about one-fifth more than in July 1952. Prices paid averaged a little less than 26 cents per can, the lowest in 3 1/2 years.

Purchases of prune juice by householders were equal to about 400,000 cases of No. 2 cans during July 1953, a little less than in June, but one-tenth more than a year earlier. Prices remained unchanged from June, at almost 34 cents per 32-ounce bottle, up about

2 cents from a year earlier. A few more families bought prune juice during July than a year earlier, and their purchases averaged almost the same per buying family, about 2 of the 32-ounce bottles.

Fresh Citrus Fruit

Household purchases of California-Arizona fresh oranges totaled about 1,130,000 boxes in July. This total was below the high levels of recent months, but more than one-fourth larger than in July last year. Purchases of Florida oranges, on the other hand, amounted to only about 250,000 boxes, considerably less than during this month last year when the season was unusually late. Total fresh orange purchases by householders in July showed a gain of about 8 percent compared with a year earlier. Consumers paid an average of 39 cents per dozen for California-Arizona oranges during July, nearly the same as a year earlier, while prices of Florida oranges, averaging 48 cents per dozen, were up 3 cents. Fresh oranges were bought by about 31 percent of all families during the month, unchanged from last July. The average purchase per buying family amounted to 2 1/4 dozens, slightly more than in July 1952.

Consumers bought almost 590,000 boxes of fresh lemons during July, almost as many as a year earlier. They paid an average of 47 cents per dozen, almost a nickel less than in the same month a year ago. Purchases were made by 35 out of a hundred families. They bought an average of 7 lemons each, the same as a year ago.

Householders bought about 320,000 boxes of fresh grapefruit during July, somewhat less than the 363,000 boxes purchased in July 1952. Prices paid averaged \$1.06 per dozen, almost unchanged from a year earlier.

Dried Fruit

About 3,780 tons of dried prunes were purchased by householders during July 1953, practically the same as in this month last year. Prices paid, however, averaged 27 cents per pound, almost 3 cents more than in July 1952. The average number and size of dried prune purchases reported by buying families were unchanged from last July. The percentage of families buying, however, declined slightly. About 8.3 percent of the families purchased dried prunes in July this year.

(Continued on page 12)

Florida Citrus Commission Presents Annual Report

The annual report of the Florida Citrus Commission was submitted at the annual meeting of that body held in Lakeland in August at which some of the high points of the Commission's activities were brought out. Some of these activities and an outline of plans for the future are given herewith:

Production of citrus fruits in Florida during the 1952-53 fiscal year declined from the record crop totaling 119,360,000 boxes the previous season to 110,520,000 boxes with the result that prices generally satisfactory to all phases of the industry were experienced. On-tree returns to the grower, estimated on the basis of data compiled by the U. S. Department of Agriculture, showed increases from \$59.6 million to \$95.9 million on oranges, \$17.3 million to \$25.8 million on grapefruit, and \$5.2 million to \$5.7 million on tangerines.

Several factors were responsible for the increased returns. Foremost, perhaps, was the decrease in the size of the crop. While the Department of Agriculture made an initial estimate of 81 million boxes of oranges in October, 1952, a reduction of 4 million boxes from this figure, made in December, 1952, had an immediate effect on the economic picture at all levels—on-tree, FOB packing house, auction market, and at all points of the processing industry. Subsequent reductions in the crop made the supply-demand picture even more favorable as the season progressed.

Another factor contributing to the satisfactory price situation was the condition of processed inventories as the 1952-53 season began. Supplies of canned and concentrated juices and salad packs were normal enabling processors to proceed at full speed, especially as it became known that the season's crop of fruit would be smaller than had been anticipated.

One additional factor responsible for increased returns to growers was the continually increasing consumer demand for frozen concentrated orange juice. Early in January, 1953, the weekly report of the Market Research Corp. of America indicated that consumers

were purchasing in excess of one million gallons of the frozen product each week. This situation continued, almost without exception, and producers were hard put to keep pace with the demand, despite a record total of approximately 46,500,000 gallons frozen during the 1952-53 season.

While actual returns from advertising and merchandising are difficult to measure in terms of dollars and cents, the Commission's programs in both fields had an undeniable impact, among the forces which acted to bring increased profits to grower, shipper, and processor. No other organization or agency in the entire citrus world has attempted to carry on such a promotional program on grapefruit and grapefruit products as has the Commission. Without this support, the plight of the grapefruit grower today might conceivably be disastrous. Directed chiefly at increasing the per capita consumption of all citrus products, the Commission's program has enabled the industry to maintain demand reasonably in balance with supply despite a 275 per cent increase in the Florida citrus crop since the Commission was established in 1935.

The trend of the industry to process more and more of the available supply of fruit continued, and about 63 per cent of the 1952-53 orange crop and 47 per cent of the grapefruit crop went into one or more forms of processed products. The production of frozen orange concentrate alone accounted for approximately 45 per cent of the total Florida orange crop.

Several events transpired during the 1952-53 fiscal year which offer great promise for the Florida citrus industry. Among them were the development of "Florida 5-to-1 concentrate", the inauguration of the Florida Citrus Commission's school education program, and the action of the 1953 Florida State Legislature in providing an increase in the advertising tax on grapefruit from four cents per box to six cents per box. The details and significance of these events will be discussed more fully at other points in this report.

A final subject which might

well be mentioned at this point is the increased interest in the work of the Florida Citrus Commission being shown by the various industry factors. During the 1952-53 fiscal year, committees of growers, fresh fruit shippers, single strength canners, and concentrators were appointed to confer with the Commission as it began preparation for its advertising and merchandising program for the 1953-54 season. The Commission welcomes this increased participation by the industry and hopes that it will continue in the future.

General Activities

The Commission investigated and approved 1292 license applications from fresh fruit shippers, canners, truckers, express shippers, brokers, etc. Of these, 1,056 were renewals and 236 were new applicants. A total of 250 special permits were issued during the season, most of them under Section 50 of the Florida Citrus Code. The Commission also issued 77 permits for the experimental shipment of new citrus containers.

The Florida State Legislature, which met during April and May, 1953, passed several measures affecting the citrus industry. Included was an amendment to the Florida Citrus Code permitting the Commission to grant special permits for the experimental shipment of a new "Florida 5-to-1 frozen orange concentrate." This revision of the code permits concentrators, upon application to the commission, to receive permits to ship frozen orange concentrate having a Brix rating of 58 to 60 degrees, as opposed to the 41.5 to 43.5 degrees Brix set forth in the code for the standard 3-to-1 concentrate. Proponents of the higher Brix contended that the new product is more stable than the old, while retaining the same true fresh orange flavor. The amendment provided that the new product should be packed only in institutional size containers. Under the law, persons or firms receiving permits for the shipment of the new product must make detailed reports to the Commission on its distribution and sale.

A second measure passed by the

1953 State Legislature increased the tax collected on each box of grapefruit utilized from four cents to six cents per box, and provided that a rebate fund of \$100,000 be set up for the next two years to refund brand advertisers of fresh grapefruit on the basis of \$1 for every \$2 spent in advertising individual brands.

The legislature also revised the maturity requirements on grapefruit, lowering them one-half point after Jan. 1 each year.

A measure affecting gift fruit shippers was enacted which provided that gift fruit shippers engaging in that business exclusively and using only their own fruit and/or fruit purchased from a licensed handler may secure a citrus fruit dealer's license without posting bond.

A final measure passed by the legislature affecting citrus allowed the Commission 10 days in which to make legal publication of new or revised regulations instead of the five days permitted previously.

The Commission continued to operate the Florida Citrus Museum at Winter Haven, which was visited by thousands of tourists to the state in the 1952-53 season.

Permissive use of the five new orange sizes was continued for the 1952-53 season by the Commission as experimentation with the new arrangement on early and mid-season oranges and grapefruit progressed.

A special committee was appointed to study citrus containers currently in use, and upon recommendation of the industry after several hearings on the subject, it was decided that the 20-pound bag should be eliminated from the list of permitted containers. Standard dimensions for all containers were established.

The Commission requested that the U. S. Department of Agriculture issue a separate estimate on the Florida Temple orange crop each month, beginning with the 1953-54 season. This request was granted.

New regulations designed to eliminate a multiplicity of count and pack arrangements on Temple oranges went into effect at the beginning of the 1952-53 season, and, after a slight adjustment at the request of the industry, were used to great advantage by shippers and receivers of Temple oranges.

New grade standards on oranges, grapefruit, and tangerines, developed by the cooperative effort

of the Commission and the U. S. Department of Agriculture during the 1951-52 season, went into effect as Federal and State standards at the beginning of the 1952-53 season.

Weekly, monthly, and quarterly reports from the Market Research Corp. of America concerning the retail movement of processed citrus products, were purchased in cooperation with the U. S. Department of Agriculture and the California citrus industry.

Weekly and monthly statistical reports compiled from various data furnished by the Florida Canners Association, the U. S. Department of Agriculture, the Growers Administrative Committee, the Market Research Corp. of America, and the Federal-State Market News Service were published by the Commission's Statistical Department and distributed to the industry.

At the request of the Florida Tangerine Cooperative, the Commission appropriated funds to defray the cost of a trip to Japan by Dr. A. F. Camp to determine if Japanese Citrus Canker is present in that country.

CITRUS SALES CONTINUE HIGH DESPITE ADVANCE IN PRICE

(Continued from page 9)

The survey indicates that consumer purchases of dried prunes totaled about 58,900 tons in the period October 1952-July 1953, about the same as in this period a year earlier. During most of this period, prices consumers paid averaged higher than in these months of the previous marketing season.

Householders bought about one-third less dried apricots than in July last year. This decline was primarily caused by fewer families buying. Prices paid averaged nearly 67 cents per pound, up about 3 cents from a year ago.

Dried apricot purchases by householders totaled about 4,700 tons during the months of October 1952-July 1953. This was a decrease of approximately 13 percent in the amount bought compared with a year earlier. Lower purchases were probably in part the result of somewhat higher retail prices consumers paid for dried apricots compared with these months of the preceding marketing season.

EMJEO

(80/82% MAGNESIUM SULPHATE)

Many years a favorite source of soluble magnesia for Florida soils. Used extensively in fertilizer mixtures for citrus crops and vegetables. Especially useful and economical for direct application where only magnesia is required.

Florida growers know the reasons why magnesium is needed so ask your fertilizer manufacturer for EMJEO, long a dependable source of this key plant food.

POTNIT

(95% Nitrate of Potash)
equivalent to

13% Nitrate Nitrogen and 44% K2O
for Special Mixtures and Soluble Fertilizers

BERKSHIRE CHEMICALS, INC.

420 Lexington Avenue, New York 17, N. Y.

SALES AGENTS FOR F. W. BERK & COMPANY, INC.

. Magnesium .

. For a Full Harvest .

tober, 1953
UE HIGH
N PRICE(00)
that con-
ed prunes
as in the
ly 1952,
is period
most of
ers paid
in these
marketing
out one-
than in
line was
families
ed near-
p abouty house-
0 tons
October
a de-
3 per-
t com-
Lower
n part
her dried
months
season.s.
mag.

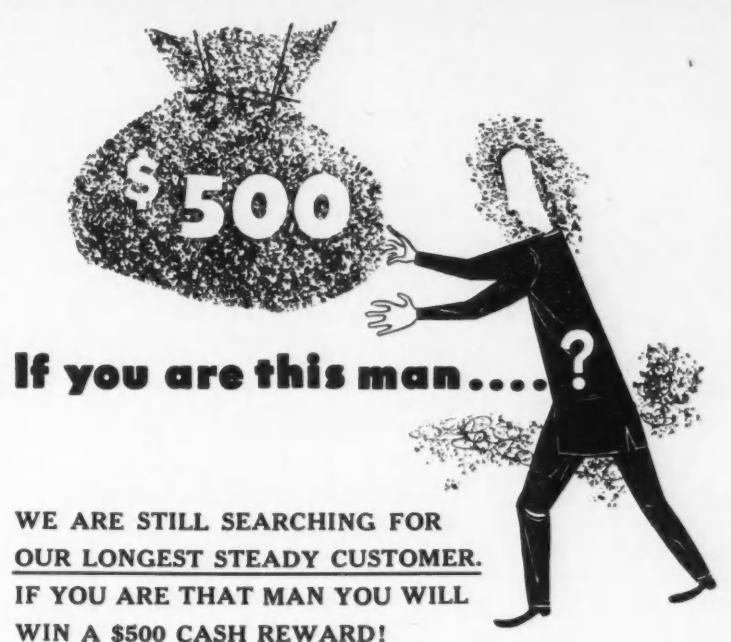
our
key**AN IMPROVED DOWICIDE A-HEXA-MINE METHOD FOR DECAY CONTROL IN CITRUS FRUITS**

(Continued from page 6)

that fruit treated with various Dowicide A-Hexamine rinse off treatments had less decay after two or three weeks when stored at 60°F. as compared to 70°F. After one week holding at the 60°F. temperature untreated fruit averaged 0.7 percent decay while there was no decay in those receiving the No. 3 treatment. It is clear, from Fig. 1 (B) that a combination of the lower holding temperature (60°F.) with Dowicide A-Hexamine gave the best control. Even after four weeks holding at 60°F. the rinse-off treatment (No. 3) still showed 69 percent decay control, while the difference between untreated lots at the two holding temperatures had largely disappeared.

In previous seasons using the original Dowicide A-Hexamine applications in which the fruit was not rinsed, excellent decay control was obtained by commercial packinghouses holding Valencia oranges in cold storage at about 34°F. Also, experimental lots treated in the same manner in the Spring of 1951 and held for nine weeks at 40°F. showed 95 percent control. In the 1952 season tests were made to establish the effectiveness of the rinse-off method for fruit to be held under 40°F. storage. The Pineapple oranges used in these tests were given both a single and a double application, but only a single treatment was given to the Valencias. As shown in Table 1, protection against decay was almost complete for eight, and very good for twelve weeks. The percentage of control was better with Pineapples than with Valencias. High amounts of decay, mostly mold appeared in the controls.

Flooding Versus Dipping Treatment.—The data shown graphically in Fig. 1 are for oranges that were dipped in the decay control solution. Since the flooding method is more adaptable to many commercial packinghouses two special experiments were carried out to compare the two systems of application in respect to decay control. Six replications with Valencia oranges were used in one experiment and eight in the other. The flooding treatment was for three minutes at 90°F. while the dipping treatment was for two minutes at 90°F. A rinse followed the application of

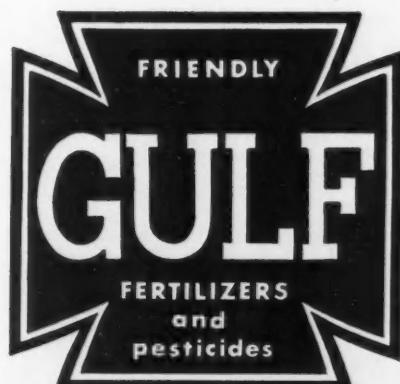


**WE ARE STILL SEARCHING FOR
OUR LONGEST STEADY CUSTOMER.
IF YOU ARE THAT MAN YOU WILL
WIN A \$500 CASH REWARD!**

We are still looking for "The Man Of Our Golden Year" and you may be that man! Get in touch with your local Gulf Field Representative today and ask him for full particulars concerning this reward and get your entry blank from him, or write The Gulf Fertilizer Co., P. O. Box 2721, Tampa, Florida, for information. Don't delay! . . . get your entry blank in today. Entries must be postmarked not later than Midnight, Oct. 10, 1953, and received not later than Oct. 15, 1953.



You can depend
on Gulf Friendly
Fertilizer . . . it's
keyed to your soil!



1903 OUR GOLDEN YEAR 1953

The Gulf Fertilizer Company • Tampa & Port Everglades, Fla.

the solution in each case. After two weeks the untreated check lot averaged 20.3% decay whereas the dip treatment averaged 2.3% and the flood treatment averaged 1.7% decay. After three weeks the decay losses were 29.4%, 7.4% and 3.4% respectively. These results indicated that the flooding method is as good if not better than the dipping method and that very good decay control was obtained with both procedures.

Summary.—The principle difficulty of the original Dowicide A-Hexamine control method, dulling of the shine, has been overcome by the addition of a rinse following application of the chemical solution. It has been demonstrated that excellent decay control and normal shine can be had by use of the rinsing procedure and that the degree of rinsing need not be precise.

The formula of the decay control mixture has been modified by the inclusion of sodium hydroxide to give a more stable solution and Na EDTA to further improve stability under hard water conditions. The solution now recommended contains 2% Dowicide A, 1% Hexamine, 0.4% sodium hydroxide and Na EDTA as needed. This is applied as a dip for 2 minutes or as a flood for 3 minutes at 90°F. and then rinsed off immediately with water at usual temperatures.

Throughout these experiments the advantage of holding the fruit at lower temperature was always evident regardless of the various decay control treatments. With the recommended Dowicide A-Hexa-

mine rinse-off treatment decay was reduced much more at 60°F. than at 70°F. storage. At 40°F. protection against decay was almost complete for eight weeks. The reported results from several packinghouses where oranges were treated with Dowicide A-Hexamine in the spring of 1953, preparatory to cold storage, are very favorable.

The recommendations in this article are not based solely on experimental work at the Citrus Experiment Station. Two large packinghouses and a number of smaller ones have been using Dowicide A-Hexamine rinse-off treatments during the 1952-53 season and have found the method entirely satisfactory in respect to shine, decay control, and general application.

References:

1. Hopkins, E. F. and K. W. Loucks. Combination of Dowicide A with diphenyl for the control of decay in citrus fruits. Citrus Magazine, Vol. 12, No. 11, pp. 24-28. 1950.
2. Hopkins, E. F. and K. W. Loucks. The Dowicide A-Hexamine treatment of citrus fruits for the control of mold and stem-end rot decay. Citrus Magazine, Vol. 13, No. 12, pp. 22-26. 1951.

POLK'S CITRUS PRODUCTION AGAIN LEADS STATE

Polk County's supremacy in citrus production was revealed again in figures for the 1952-53 shipping season published in the annual report of the Citrus and Vegetable Inspection Division of the State Department of Agriculture.

The fresh fruit volume for the

season totaled 41,270,062, of which Polk moved 13,051,824 boxes, or more than 31 per cent. Cannery receipts for the year throughout the state were 62,070,220 boxes, of which Polk consumed approximately the same ratio as in fresh fruit.

Polk's fresh fruit total was greater than the combined figures of Orange and Lake County, its nearest competitors. Orange shipped 7,335,494 boxes and Lake, 4,804,210 boxes.

The overall total for the state as a whole was nearly 6,000,000 less than the 1951-52 season. The fresh fruit total dropped from 47,322,614 boxes while the cannery-concentrate total noted above was only slightly higher than last season's 61,700,647 boxes.

Complete CITRUS GROVE MANAGEMENT

The Very Best of Service to Grove
Owners of either Large or
Small Groves

Servicing The
Polk County Area

**LOGAN & RICKBORN
INC.**

LAKELAND, FLORIDA

2609 Orleans Avenue — Call 6-0501

STAUFFER

...setting new standards
of quality and service in

Stauffer
CHEMICALS

AGRICULTURAL CHEMICALS

Stauffer Chemical Co.

STAUFFER CHEMICAL COMPANY
APOPKA TAMPA WINTER HAVEN VERO BEACH

Proposed Changes In Inspection Hours

**Robert C. Evans, General Manager,
Florida Citrus Commission**

At its meeting recently the Citrus Commission discussed a proposal by the Inspection Service for a change in the hours of inspection at fresh fruit packinghouses. Regulation No. 7 provides that inspection shall be made available between the hours of 7 a. m. and 11 p. m., except Sundays. The Inspection Department has proposed that the hours of inspection be changed to 7 a. m. to 9 p. m. The proposal from Mr. Mayo includes the following:

"90% of our force is employed seasonally and beginning this season we have found it necessary to grant such employees some consideration for what might be classed excessive hours of daily service. However, we feel sure that with some reduction of the number of hours an inspector is subject to call and close cooperation with the fresh fruit operators, we should be able to hold the over-time hours within a reasonable figure."

The Commission requested that the packinghouse operators be notified of this proposed change and that they be asked to let us have their views concerning the change. Please let us hear from you.

Stolen Field Crates

At the meeting the Commission discussed the problem of stolen field crates and asked the Attorney to give consideration to a regulation that will assist in preventing such thefts. It was suggested that a regulation might be adopted which would provide severe penalties. The matter will be considered again at the Commission's October meeting.

USDA PROPOSES STANDARDS FOR GRADES OF FROZEN CONCENTRATE FOR LEMONADE

The U. S. Department of Agriculture has proposed issuance of U. S. Standards for Grades of Frozen Concentrate for Lemonade, the first to be formulated by the Department for this product.

The proposed grades for the product are "U. S. Grade A" or "U. S. Fancy", and "U. S. Grade B" or "U. S. Choice". When the quality falls below U. S. Grade B or U. S. Choice, the product would

be classified as "Substandard".

The proposed standards provide that the lemonade made from this product, when made in accordance with the manufacturer's directions, test not less than 10.5 degrees Brix and contain not less than 0.7 grams of acid per 100 milliliters of the lemonade, and that the Brix-acid ratio not exceed 20 to 1. Quality of the product would be based on the scores for color, absence of defects, and flavor.

Monopolist: A man who keeps an elbow on each arm of his theater chair.

HOUSE COMMITTEE ON AGRICULTURE SEEKING OPINIONS OF FARMERS

Farmers of the South are going to have a voice in the agriculture program being shaped by Congress for its next session beginning in January. A committee on agriculture is now holding official hearings in many areas of the South and seeking answers from farmers and other leaders as to the type of program which Congress should foster as being the most benefit to farm families and the country as a whole.



Sweet Extra Profits From d/p DOLOMITE Sweet Soil!

Everything else you do to produce better pastures, better crops brings you extra profits when you apply d/p Dolomite.

By restoring the acid-alkali balance in the soil, d/p Dolomite releases many natural plant foods. And it supplies the calcium and magnesium needed for better crops, healthier cattle.

For complete information and free illustrated folder write today

**DOLOMitic LIMESTONE, HI-CALCIUM LIMESTONE,
LIMESTONE SCREENINGS**

DOLOMITE Products, Inc.
REPRESENTATIVES
E. J. Meyer
Box 328
Arcadia, Florida
Joe C. Middleton
Box 578
Ocala, Florida
W. H. Cook
1414 Lake Bonny Dr.
Lakeland, Florida

Ocala, Florida
PHONE MArion 2-3261
Plants at Lebanon (Levy County)
and Sarasota, Florida

ADVERTISEMENT — LYONS FERTILIZER COMPANY

The LYONIZER

Department

COMPILED BY THE LYONS FERTILIZER COMPANY

Reports Of Our Field Men . . .

PASCO AND HILLSBOROUGH COUNTIES

E. A. McCartney

Plenty of rain, too much in some places the last few weeks. Groves are looking good and fruit buyers are out on the job. Some grapefruit has been shipped. Canning plants are about ready to start operations. Early Fall fertilizer is being put out. By the tenth of October we should be real busy.

Growers are planning on using plenty of fertilizer this Fall as everything points to fair prices for the coming crop.

Vegetable growers are well along with their Fall planting. The rains have held up their operations somewhat.

Pastures are in good condition, couldn't be otherwise with the weather we've been having.

NORTH HILLSBOROUGH AND PINELAS COUNTIES

J. A. Hoffman

Heavy daily rains throughout the middle of September has delayed the chopping of cover crops and stopped all spray programs for rust mites. Rust mites are still active and all groves should be closely checked and a sulphur spray should be applied for control.

Early fruit is sizing up nicely and beginning to break color. Early picking is expected in most groves and the size is better than usual with lot less fruit per tree.

As soon as the weather permits Fall cultivation should start and an early fertilizer program planned to get the best results from Lyonizing your grove or crops.

Pasture men are busy storing hay for the long winter months ahead and report a good yield of Pango grass and Hairy Indigo for winter roughage.

WEST CENTRAL FLORIDA

J. E. Mickler

An air of expectation hovers over the citrus industry right now, the beginning of another season is at hand. Limeing of groves have been underway these past weeks, to take advantage of the rain and be ready for fertilizer applications the following month. Importance of that application of lime cannot be stressed too much,

and more attention will be paid that treatment as more facts become an important part of the citrus program.

Contrary to belief of some, this coming Fall application of fertilizer to the pasture will be the important application. Maintenance of condition is important, and the years' output of the cow or steer on the range will be reflected in the condition of that animal as it emerges from Winter pastures.

SOUTHWEST FLORIDA

Eaves Allison

Rain has been a potent factor over most of the West Coast area, to plague the beginning of this new season. Parts of the Fort Myers section have had many inches of excess water and flooded conditions while other parts of the same area have had barely enough. So spotty has the fall been that it is almost necessary to go and look. The same condition exists pretty well from Ruskin down through the Palmetto, Bradenton and Sarasota growing areas.

Plantings of Fall vegetables look pretty good, tomatoes, peppers and cukes — Celery seed beds are fairly good and are being set in the field at this time. Pasture crops, both hay and grazing stands are very good now, Sept. 15th.

Citrus looks fair, with much small and rusty grapefruit. Mid-season and late oranges seem to be pretty good, both as to size and appearance. Cover crops are heavy and appear to be seeding well.

Early blocks of gladiolus bulbs are going in the ground now, with about the usual acreage being prepared to follow. Generally speaking, prospects are so-so.

HIGHLANDS AND POLK COUNTIES

J. T. Griffiths and J. K. Enzor, Jr.

Late August and early September were marked with steady rain fall throughout the Ridge Section. It is presumed that this may have delayed maturity somewhat. In any case, some grapefruit was picked during the second week of September. It is expected that picking will pick up with each successive week. The major problems on grapefruit are lack of size and too much acid. Size will apparently be

a general problem on grapefruit throughout this area.

Growers are beginning to think about Fall fertilization. There will be a definite trend away from some of the so-called radical programs which have been in effect during the past few years. These programs have not proven to be satisfactory and some growers will return to a more stable one. Fall fertilization will start the first of October.

Rust mites have continued to be a problem and there is sufficient red scale in some groves to warrant a scalicide. Scale does not look to be a serious problem for this Fall at the present time.

SOUTH POLK, HIGHLANDS, HARDEE AND DESOTO COUNTIES

C. R. Wingfield

At the time of this writing (17th) we are still confronted with high water. On late we did have three days without rain and thought we would have a let-up but "Edna, the Hurricane" had other ideas and sent us a shower lasting most of a day and a half. Ditches, creeks, rivers and lakes are full and overflowing which has become a hazard to farm lands and also to citrus planted in low areas. Farmers are unable to plant and where some have been able to plant the crop cannot grow properly because of rains.

NORTH CENTRAL FLORIDA

V. E. Bourland

We have been having plenty of rain, and then some. Grove owners on flat land have been very busy digging ditches, and trying to get the water off of their groves. Some trees are in bad shape in spite of their efforts. Groves on high land are looking good, and fruit is sizing up nice, but quite a bit of rusty fruit. Cover crops are good, and where dry enough are being cut in. Young trees are being worked and fertilized. Truck farmers are beginning to turn their land where possible, and plant seed beds. The rains have delayed most everyone.

Pastures have been flooded, and cattlemen have been very busy trying to save their cows by moving and feeding them. Everybody is hoping the rain will stop and we don't get a real gale.

October, 1953

ADVERTISEMENT — LYONS FERTILIZER COMPANY

**Uncle Bill Says:**

We've had a lot of rain and several times in the past month have been threatened with hurricanes . . . which up to the time we're writin' this here effusion hain't hit us . . . and it sort of keeps us a settin' on the edge of our chair.

Fer be it from us to speak slightly of any full grown Florida hurricane . . . it's shore sumpin' to be disturbed about . . . but when you git right down to cases they ain't a durn thing we can do about one if'n it happens to head our way, and all the worryin' and frettin' and cussin' we may do ain't goin' to help a bit . . . and all such carryin's on will accomplish is to upset our digestions and our dispositions.

So, fer as we're concerned we're jist goin' along tendin' to our business and eatin' our three squares a day and doin' a heap of hopin' and maybe a little prayin' that we'll miss a hurricane for another season.

One thing is fer sure we're plannin' right now to get on our Fall application of fertilizer jist as soon as our soil will permit, 'cause hurricane or calm our trees is goin' to need all the good plant food we can give 'em to keep them strong and healthy so that they'll produce the best citrus crop that kin be raised.

We're goin' to keep after any pests, too, that may try to take over our business and see that our groves is properly cultivated and given every care we know how to give 'em so that when we market our crop the buyer will say that he got a swell crop of fruit off of Uncle Bill's grove.

Might add that it's been our experience over a long period of years that Lyons Fertilizers gives us the best possible results . . . that's why we keep on year after year usin' this top grade fertilizer.

Notes Of The Trade . . .

SWAIN NAMED NACO PASTURE CONSULTANT

Hiram L. Swain has recently joined the staff of the NACO FERTILIZER COMPANY as pasture consultant in Florida. Swain was formerly connected with the Soil Con-



servation Division, U. S. Dept. of Agriculture, stationed in Martin County.

The Swains and their three children are planning to move to Fort Pierce in the near future.

Swain graduated from the University of Georgia with a degree in agriculture. Following graduation he became associated with the Soil Conservation Division. With exception of three years served in the service during World War II he has been with the above department until his association with Naco.

GALE MADE EDITOR FERTILIZER REVIEW

John F. Gale has been named editor of NATIONAL FERTILIZER REVIEW, official publication of The National Fertilizer Association, by Russell Coleman, president. The REVIEW, with a 40,000 circulation, is primarily read by professional agricultural workers throughout the United States.

In addition to his responsibilities as editor of the REVIEW, Gale will edit and assist in the preparation of NEA's educational projects including pamphlets, brochures, motion picture scripts and so forth.

McDANIEL JOINS STAFF OF FOOD MACHINERY

Charles D. McDaniel, formerly with the Florida Citrus Mutual, has joined the national Flavorseal market organization as the Chicago representative of Food Machinery and Chemical Corporation's fresh fruit and vegetable protective service.

McDaniel has just returned from California where he spent two weeks getting acquainted with the Western citrus, tomato, and melon dealers. He will relieve E. W. (Doc) Miller who has been on the Chicago market for Flavorseal since the resignation of Harry H. Butts, Jr. in May. Miller will return to his job as West Coast market representative after a visit to the Denver and Salt Lake City market.

ARN JOINS FLORIDA CITRUS COMMISSION

Frank D. Arn, general merchandise manager for the Kroger Company's nation-wide chain of food stores, joined the staff of the Florida Citrus Commission as director of merchandising, effective September 16.

The 43-year-old Ohio native assumes overall direction of the state agency's merchandising program in the United States and Canada, and Ralph M. Henry, present director of merchandising and advertising, will fill the newly created post of director of sales service.

Arn comes to the Commission from a background of 20 years' experience with the Kroger organization, which is one of the three largest national food chains in the United States.

Although his employment became effective September 16, Arn will probably make some contacts in the northern markets before reporting to the Commission's headquarters in Lakeland October 1.

citrus crop in 1953-54 than during the past season. The outlook is for a highly favorable inventory position when the new crop comes into production, depending largely on the pricing of the canned and frozen product during the coming months.

Classified Ads

SUPERIOR CITRUS TREES — Now available on Rough Lemon, Sour Orange, Sweet Orange, and Cleo Rootstocks. Prices \$1.10 up, depending on the size and number ordered. Also Seedlings for lining out of all varieties. Write for "Tips To Growers."

WARD'S NURSERY
Avon Park, Fla.

PENSACOLA BAHIA SEED — Purity 96.96 percent, germination 92 percent, \$20.00 CWT. Paraguyan Bahia Seed, purity 98.18 percent, germination 91 percent, \$50.00 CWT. Florida Black Rye, purity 99.84 percent, germination 91 percent, \$4.00 bushel.

LEWIS & VICKERS SEED CO.
P. O. Box 1117 Phone 3828
Haines City, Florida

Early indications are for a larger

Get in on the



Pay Off!

FERTILIZE NOW!

NACO Fall fertilizing cannot be over emphasized in producing superior quality fruit. It's like putting money in the bank on next year's harvest.

NACO Fall fertilizing restores the health and vigor of the tree which has used all the available food to produce this year's crop of fruit.

NACO fertilizing now is very important because the trees take up plant foods during the winter months. This food is stored in the terminal buds in the form of carbohydrates and is readily accessible when it is needed for a heavy Spring Bloom.

NACO'S field representatives are tops and they are ready to serve your every need in agricultural chemicals.

Try Naco and Compare Results

**NACO FERTILIZER
COMPANY**

JACKSONVILLE

FT. PIERCE

FLORIDA

Top Quality Crops Bring Top Profits

The mere identification of a fruit as citrus does not necessarily mean that it is outstanding in appearance or delicious in taste . . . and the consumer need not necessarily be an expert to tell the difference.

But most every user of citrus can determine for themselves the quality of the citrus they buy . . . healthy, clean appearance always attracts the buyer and fruit which is a delight to the taste invariably attracts more sales.

So it inevitably follows that top quality fruit not only is more attractive to the buyers, but is more apt to bring premium prices on any market.

LYONS FERTILIZERS *Produce* **Maximum Crops** **Of Highest Quality**

So whether its fine citrus fresh fruit, or canned, or concentrate fruit juice . . . or whether you seek to produce the best vegetables it is possible to raise, we recommend that you use Lyons Fertilizers.

LYONS FERTILIZER COMPANY

PHONE 43-101

TAMPA - FLORIDA

LOS ANGELES PUBLIC LIBRARY
630 WEST FIFTH ST. 1249
LOS ANGELES 13, CALIF.

